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PUBLIC ACCESS TO CONGRESSIONAL SUPPORT AGENCY INFORMATION IN THE TECHNOLOGICAL AGE: CASE STUDIES

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United States Congress

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EXECUTIVE SUMMARY

PUBLIC ACCESS TO CONGRESSIONAL SUPPORT AGENCY INFORMATION IN THE TECHNOLOGICAL AGE: CASE STUDIES

Draft Report for the Office of Technology Assessment

Stephen Frantzich
Congressional Data Associates
November 1987

The Congressional support agencies (Congressional Research Service, General Accounting Office and Office of Technology Assessment) were created for the primary purpose of providing Congress with information and analysis necessary for high quality decision-making. Unlike the previous case studies (Frantzich 1987) of traditionally public congressional materials (The Congressional Record, Committee Reports and Hearings, etc.), there is no automatic presumption of public access to this material.

Most current support agency products are available to that small segment of the public who know enough to use their congressional office contacts and somewhat less importantly to those knowing of the availability of selected materials through the depository library program. Although support agency materials will never have a wide general audience, few inside or outside of Congress feel that the current dissemination procedures satisfy the potential demand. The use of new technology within the COngress has already revealed the threat that once the Congress discards document for its own electronic version, the printed product will become less available, and/or be available in a less timely manner. Information technology is a two-edged sword, holding the potential for either expanding or limiting public access. After assuring efficient accomplishment of its legislative responsibilities, Congress' next priority must lie in harnessing new technology to expand access rather than limit it.

THE RATIONAL FOR PUBLIC ACCESS

Support agency information and analyses serve as important bases for congressional decisions. If the public is to play a meaningful role in the congressional policy process, they need to understand the underlying assumptions and data available to Congress. Without such an understanding, the public can be severely handicapped in developing position and acting on suggested policy alternatives. In more practical terms, a freer exchange of support agency information--and the awareness that support agency research would face public scrutiny--is likely to improve the quality of support agency analysis. If immediate access to congressional support agency information is deemed to be politically threatening, methods must be developed for providing after the fact access for historical purposes. This would not only allow reconstruction of the policy process in the hope of improving it, but would also make support agency analysts aware that their efforts would eventually be subject to wider scrutiny. The introduction of technology supported methods

of information creation and dissemination provides a new challenge to public access. At a minimum, new technology threatens to limit currently accepted levels of public access by reducing or eliminating the distribution of printed materials as the electronic version becomes the standard for in- house use.

SOME GOALS POTENTIALLY COMPETING WITH PUBLIC ACCESS TO SUPPORT AGENCY INFORMATION

Support agency personnel expressed the general concerns about public access discovered in the previous case studies. They were hesitant to take on any additional public access tasks which would hamper agency support of Congress by reducing efficiency, which would increase cost without any identifiable increase in revenue, and which would allow their information to be used to politically embarrass Congress or its Members (see Frantzich, 1987b, p. 2). To these concerns, a number of agency representatives argued that their agency played a very important role in maintaining the balance of power between the branches of government. They argued that Congress was regularly overwhelmed by information from the executive branch and from the private sector. The support agencies stand as one of Congress' few sources of high quality, relevant and independent information. Sharing this information with the public could reduce its quality, relevance and independence and would certainly reduce the redressing of the information imbalance brought about by the creation of the support agencies.

The different support agencies feel these pressures both to different degrees and in different ways.

APPROACHES TO PUBLIC ACCESS

The various support agencies, generally under the direct guidance of Congress, have developed with different philosophies of when and how the public should have access to their information products. The **Congressional Research Service** is the most restrictive, working under the principle that public access to its information is the exception rather than the rule, and that it is only possible with explicit congressional intervention. The official position within CRS, reflecting language in its yearly appropriations legislation, is that public access would put an undue burden on CRS staff and would demean the quality and usefulness of CRS contributions. A competing philosophy expressed privately by some CRS staff, and publicly by a number of outside groups, asserts that increased and regularized public and peer review would enhance the quality of CRS products. Despite a relatively restrictive official position on direct public distribution, a large volume of CRS materials end up in the hands of individuals and groups who can afford commercial services or who know how to tap the back door sources.

The **General Accounting Office** assumes that the vast majority of its efforts will eventually enter the public domain, but gives the requesting committees a significant role in determining if and when a particular report will be released. The **Office of Technology Assessment** has developed a process of review and evaluation which engages the

"informed public" at an early stage in the assessment process and encourages widespread dissemination of its final products.

CHALLENGES AND OPPORTUNITIES OF NEW TECHNOLOGY

The vast majority of support agency information products is currently developed on word processing equipment, but distributed almost exclusively in traditional hard copy printed form. The fact that electronic versions currently exist is beginning to enhance the printing process and hold out the potential for direct electronic access. The current lack of government-wide standards for electronic publishing makes full utilization of this potential difficult at this time. At a minimum, the support agencies need to begin centrally archiving and maintaining the electronic versions of their products so that when direct access either within Congress or by outside vendors is approved, the raw material will still exist.

Some support agency products are currently in the form of electronic data or searchable data bases. There are virtually no technical and very few practical reasons why these products could not be sold to vendors or given to depository libraries and other public agencies as by-products of existing procedures. The lack of technological impediments to such access brings the political and philosophical reasons into focus. The variety of formats currently being planned or used by the support agencies (word processing disks, tapes, CD-ROM, video-disk, etc.) will require a more expansive definition of "documents" and a broader capability for distribution by the Superintendent of Documents. Since the market for electronic material is still sorting out, a permissive policy on formats for distribution is most likely to provide a fair test of economic viability for various products. It is clear that different support agency products suggest different dissemination formats for best serving the public. Congress can not simply cast its products to the wind with no regard for the broadest definition of public access. The depository libraries and other clearly public access points need to be preserved as competitive sources of technology enhanced congressional information.

New technologies offer significant potential for both better servicing Congress' information needs while making congressional information available in a more timely and useful manner to the public. As Congress moves toward technologies such as CD-ROM for its own use, significant cost savings could be discovered by disseminating static information such as bill digests and support agency reports to depository libraries in that form. If Congress is really committed to public access, it should be in the forefront of using new technology to enhance access rather than fighting a series of case by case rear guard battles which are perceived as opposition.

POTENTIAL IMPACT ON THE GOVERNMENT PRINTING OFFICE

Very little of the support agency material is printed directly by GPO, thus changing the printing procedures would have little direct impact on GPO printing. A considerable amount of support agency printing is done either by in-house print shops or through GPO monitored contracts. The support agencies show considerable lack of enthusiasm for GPO contracting in general and/or specific contracting procedures.

Support agency experience verifies the importance of the Superintendent of Documents distribution procedures which centralize listings, ordering procedures and distribution to the depository libraries. None of the support agencies wish to completely support their own independent distribution operations, but do feel a need to augment SupDocs promotion. With the growth of new formats, it is important for SupDocs to retain its role as the "one stop shopping" agency for congressional information in whatever format it becomes available.

NOTE ON METHODOLOGY

This document is based in part on interviews with support agency staff. The interviews, when used directly, are cited without specific attribution in order to protect the confidentiality of interviewees. The document also reflects in part support agency review comments, which have been incorporated where appropriate.

PUBLIC ACCESS TO CONGRESSIONAL SUPPORT AGENCY INFORMATION IN THE TECHNOLOGICAL AGE: CASE STUDIES

INTRODUCTION

The following case studies of congressional information dissemination by four congressional support agencies (Library of Congress, Congressional Research Service, Office of Technology Assessment and General Accounting Office) expand on previous work focusing on the general issue of public access to congressional information (Frantzich 1987a) and more specific case studies of primary congressional information products such as the Congressional Record, committee documents, bill status information and scheduling data (Frantzich, 1987b). The materials covered in the previous case studies fall so clearly among those which must be in the public domain in order for citizens to play a meaningful role in a democratic society that little question arises over public access per se. The debate is not over whether public access should be allowed, but rather when, how and in what format the information should be made available and/or actively disseminated by the Congress. As new technology changes the ways in which this information is gathered, used and disseminated, Congress is being forced to evaluate the impact of such changes on cost to the government, equity of public access, competition with the private sector, government efficiency, and similar issues. Underlying the entire issue is the degree to which new technology will change the role of the Government Printing Office, the Document Rooms, and other disseminators of congressional information in traditional printed formats.

When one moves to a discussion of current and future public access to information created and/or increased in value by the congressional support agencies, these same issues are expanded to include a determination as to which information the public has a right to access at any time in any form. The presumption of public access is not automatic when it comes to information created by the congressional support agencies. There is no overall policy or philosophy guiding the support agencies as a whole when is comes to public access. Agencies see themselves as performing very different functions and under the guidance of Congress have developed procedures, traditions and legislated restrictions for their individual relationships with the public. Throughout the over forty interviews conducted for this analysis the common theme that "our primary customer is the Congress, and public access must be subordinated to their goals and desires" pervaded virtually every discussion. Different agencies, and to some degree various individuals within those agencies, expressed different opinions as to the degree to which supporting the Congress stood in the way of providing public access. Differing receptivity to the basic right of public access in turn affected agency receptivity to using new technology for providing

AGENCY CASE STUDIES

Each of the targeted support agencies will be discussed in detail, with particular reference to their past, present and future role in disseminating congressional information to the public, particularly in light of technological change. While the focus is on "congressional

information" (that information about, produced by or primarily used by the Congress) some attempt will be made to put congressional information in the broader context of each agency's mission. Although the Congressional Research Service (CRS) is technically part of the Library of Congress, its unique role and approach to public access warrants distinguishing between the two.

The Congressional Research Service (CRS)

THE ROLE OF CRS

CRS serves as Congress' in-house "think tank" providing everything from a quick quote or fact over the phone to detailed analyses of major issues. Whenever broader public access to CRS is discussed, spokesmen point out that:

> The needs of Congress are not the same as those of the general public, university scholars, business and other interest groups, or journalists. Members of the CRS staff are trained to write succinctly and under very short deadlines...The style and format utilized by CRS may not be appropriate for other audiences; general publication of our reports might well require changes in the nature of our products and the outlook of our researchers, which would ultimately detract from our usefulness to congressional clients....The knowledge that CRS reports will not automatically be made available to others enables Members thoroughly to explore and develop legislative proposals without the danger of premature publicity which could well damage their freedom to study and choose among alternative policies (Gilbert Gude, former CRS director, quoted in U.S. Congress, House, Committee on Science and Technology, 1979, p. 35).

CRS spokesmen vigorously assert that full commitment to Congress' needs is a vital part of the "constitutional doctrine of separation of powers...The congress does not have the extensive bureaucracy available to the President and the executive departments, but deals with the executive branch on equal footing by developing its own information resources" (Gilbert Gude, former CRS director, quoted in U.S. Congress, House, Committee on Science and Technology, 1979, p. 33). Staff members proudly point out that "We are Congress' research arm." "Congress is our boss and serving anyone else would dilute our efforts."

CRS INFORMATION PRODUCT ANALYSIS

Confidential Reports

Members of Congress and its committees approach CRS for confidential analyses of policy issues. Written reports are developed on microcomputers using Word Perfect word processing software (the standard throughout CRS), and are generally sent to the requester in hard copy form. At times, the hard copy will be augmented by oral briefings. Results of CRS analysis remain the property of the requester until they explicitly give approval for wider distribution within the Congress. If there is wide interest in a topic requested by one Member or committee, CRS may ask the original requester for permission to distribute it as

a report and list it in the Guide to CRS Products which is distributed within the Congress. CRS officials estimate that about 80% of CRS research efforts begun on a confidential basis remain unpublished.

No one seriously asserts that the public should have access to the confidential reports of CRS. Members of Congress need the ability to commission research without public or colleague scrutiny if they are to explore all options. Much of the material created by CRS as confidential reports ends up being included in committee debates, and/or turned into more widely distributed official CRS reports.

Proprietary Congressional Information: CRS Reports, Issue Briefs, Info Packs and Data Bases

CRS produces a number of information products directly available only to Members of Congress and their staffs. Full fledged analyses are duplicated (not printed) in-house as CRS Reports. Reports are produced on Word Processing disks in each of the research divisions. Hard copies are sent to the print shop for offset printing. After the initial supply (300-500) is exhausted, the analyst is consulted before reprinting to determine whether an update is necessary. While the original disks are kept in the research divisions, some experimentation is being done on electronic transfer and printing materials directly from disks in the print shop.

Short and succinct analyses of pressing policy problems are distributed as Issue Briefs. While distributed primarily in hard copy form, some on-line access currently exists. The availability of Issue Briefs on-line is currently in a transition stage. Older Issue Briefs are maintained in full text form on-line, while newer ones only include summaries on-line. With the upgrading of computer facilities, the eventual plan is to go back to full text on-line retrieval. Some Issue Briefs are also maintained in audio form. All written CRS products are created on word processors using Word Perfect. For those which eventually go on- line, word processing disks are directly uploaded into the mainframe. CRS Reports and Issue Briefs are viewed as "working drafts awaiting updating", even after going through the internal review process. Consistent with this philosophy, relatively small numbers of each report are duplicated in-house to avoid large inventories of a particular report after an update.

CRS Info Packs are the CRS products most explicitly designed to satisfy general audiences just beginning to develop an awareness of a topic. They include a collection of clippings, CRS reports, speeches, etc. on a variety of topics from "Abortion" and "Acid Rain" to "Terrorism" and "Welfare and Poverty". At any one point in time over one-hundred info packs are actively maintained.

CRS enhances the research efficiency of congressional staff by providing a selective dissemination of information (SDI) alerting and acquisition service. Congressional staff develop a profile of their policy interests, and CRS and LOC data bases are searched weekly to alert staff of new articles and books on those topics. After reviewing the bibliographic information on the identified items, congressional staff are able to order copies for review. Beginning in the early 1980's, CRS joined the broader LOC optical disk project to more efficiently store, search and recover the full text of articles in over seventy periodicals.

CURRENT PROCEDURES FOR DEVELOPING AWARENESS OF CRS PRODUCTS: CRS expends considerable effort to increase awareness of its products and make them available to congressional offices. Once duplicated, reports and issue briefs are listed in the quarterly Guide to CRS Products, with new products highlighted in the monthly Update. These two publications are sent to all congressional offices with the warning "For Congressional Office Use Only". Some CRS products are highlighted in the CRS Review, published ten times per year for both congressional and public use.

CRS provides much of its service to congressional offices over the phone. Staff are frequently made aware of CRS products when they call the inquiry section for information on an issue.

CRS products are also included in the CRS maintained Citation File (CITN) available to all congressional offices through the SCORPIO system. CITN was designed to support the research needs of senior specialists within CRS. It does not purport to be a comprehensive bibliographic data base, but rather focuses on articles, reports and convention papers of particular relevance to congressional policy making. In any one specific substantive field there is probably a better database available commercially. Over the years the emphasis of CITN has shifted from supporting senior specialists solely, to supporting more junior generalists on Member staffs, thus making the data base look more like those available commercially. An abridged form of the CITN file is available via the public terminals in the Library of Congress (LOC) under the label BIBL. It excludes those items (CRS reports) which the public would not have a direct right of access. In the view of one senior analyst,"At the time CITN was created, such data bases were relatively rare. With the explosion of such efforts, CITN may not stand up very well against commercial competitors. Within CRS we are considering going with the commercial services for non-CRS material." Others within CRS assert that "by any standard of the industry (coverage, timeliness, thoroughness, accuracy), the CITN file would measure up extremely well. We use commercial sources to supplement CITN for areas such as news that it purposively does not cover. We search CITN at least three times as often as we use commercial services."

The CITN file is currently going through revision and will be replaced by a "CRS Products File" including only CRS materials and a citation file of published materials (equivalent to the BIBL file available through the public terminals). The intended goals are to speed up the searching files by reducing their size and to increase the visibility of CRS materials within the Congress. The CRS Products File will augment the current bibliographic information with a one page executive summary of each document.

Following the dictates of scholarly research, CRS analysts fully footnote their sources, particularly in the CRS Reports. These footnotes often include references to previous CRS work. A requester receiving an initial CRS product often "follows the footnote trail and generates additional requests".

The general, and even the specialized public, is only vaguely aware of CRS and its products. Congressional offices are warned not to distribute lists of CRS products to the public, although some lists are undoubtedly made available. The CRS Review presents an

interesting problem. The Review is caught in the dilemma of speaking to two audiences. It is clearly described inside the front cover as "a digest of selected policy research and analysis **for the U.S. Congress**" (emphasis added), but over 1300 copies go to the general public through the Government Printing Office. While the general discussions of issues are of use to the public, public readers are placed in a "Catch-22" situation when they are informed of CRS materials to which they can not have access. The order form at the back clearly states "Congressional Office Use Only", and inside the front cover readers are alerted that "CRS products cited in the CRS Review are available only to congressional offices." CRS reports that after each issue of the Review "two to three hundred requests come in from congressional offices to provide constituents with the products mentioned."

The recent private sector initiatives in disseminating CRS products (see later discussion) are undoubtedly raising public awareness of what is available from CRS. Sophisticated academics, librarians and other researchers receiving promotional literature on private sector services often realize that they can use the indexes or advertised listings to circumvent the vendor and acquire the item directly from their congressman.

Initial public awareness of CRS products often emanates from the congressional office. In response to a general constituent request of "can you tell me anything about------", the congressional office responds by sending out the appropriate CRS material. Immediate satisfaction of one's information request undoubtedly whets one's appetite to initiate further requests.

CURRENT DISSEMINATION OF CRS RESEARCH PRODUCTS:

Congressional Methods: Any congressional office (Member, committee or support agency) can request non-confidential CRS products for their own use, but individual Members' offices serve as the exclusive official distribution points for access by the public. After detailed discussions of limitations on public access, some CRS staff members observe that, "of course the public can always go through their congressman," "a lot of our stuff goes out the back door via Member offices," or "we have no control over what Member offices do with our material. Once it leaves here we wash our hands of it." CRS management firmly asserts that Congress and its Members are in the best position to determine what CRS material should be distributed:

> By acting as a 'gate-keeper,' Congress serves as a buffer between CRS and the general public, ensuring that the central thrust of CRS research efforts remains focused on matters of immediate congressional concern and that the Service's unique relationship with Congress is preserved (September 1988 CRS comments on draft contractor document).

CRS management further points out that particularly in times of budget austerity that "Congress needs to be in a position to strike an appropriate balance between the resources that CRS devotes to constituent as opposed to legislative services."

CRS products can be ordered by congressional offices via phone, letter or electronic mail. Offices can speed up the acquisition process by going to one of the seven reference centers scattered throughout the congressional office buildings.

It is impossible to determine either the level of public demand or volume of public distribution. CRS does not require offices to indicate whether the material is for office use or to pass on to a constituent. Within CRS it is the impression that "the demand for CRS material is cyclical with heavier demand in election years and highly dependent on press coverage. When SIXTY MINUTES refers to one of our studies, the phones ring off the hook for a day or two." The volume of CRS products distributed indicates considerable distribution beyond Congress. In 1986, over 83,000 CRS Reports,187,600 Issue Briefs and 158,000 Info Packs (which also often include additional copies of CRS reports) were distributed. The Info Pack data is particularly enlightening since this product is most clearly designed for servicing constituents. All of these products are distributed in hard copy form.

The traditional procedure for public access involves a constituent request, a telephone call or "buck slip" (a written request) to CRS requesting the report, sending the report to the congressional office, and the congressional office mailing the report to the constituent with an appropriate note or stamp indicating "compliments of congressman -------."

Direct access to the substance of CRS reports is less a matter of concern over distribution than a hesitancy on the part of Members and staff alike to remove from congressional offices a very concrete service which they can provide for constituents. Constituents "in the know" realize that they can tap CRS expertise by a call or letter to a Member's office requesting a specific report or asking for a search of available material. Some constituents unaware of CRS services find their letters responded to with the inclusion of CRS material.

Constituents contacting CRS directly have no right to CRS material, but a large number of offices (including all Senate offices) have given the CRS Library Services Division blanket permission to respond directly to the kinds of requests they would have referred to CRS anyway. If the information requested is general and/or outside of CRS reports, the request is sent to the main reading room of the LOC. The main reading room answers requests which draw on uniquely LOC materials, but encourage requesters to use their state, regional and local libraries when it is most appropriate. Direct response to public requests is an attempt to most efficiently satisfy citizen needs without having them "bucked" from one office to the next. Because of the political sensitivity, prior Member office permission was explicitly sought by CRS. For offices giving such permission, CRS sends out the material with a form indicating that in the future requests should go directly to the congressional office. The congressional offices is supplied with a copy of the incoming letter and informed of the CRS response.

Private Vendor Distribution: University Publications of America (UPA) offers a full set of CRS reports on microfilm accompanied by a limited index. A number of years ago Congressional Information Service (CIS) approached CRS directly to gain access to CRS products but was turned down. UPA approaches Members of Congress to get "pirated" copies; then microfilms them. UPA highlights the "Library of Congress" and the "Congressional Research Service" in its advertising, with the brochure looking like a congressional product promotion piece. The advertising emphasizes that:

> Hundreds of significant studies written for the United States Congress are NOT

> published by the Government Printing Office, are NOT sent to the depository libraries, and are NOT included in any subscription series of government documents...Yet these studies are widely known as the best source of information for current topics of national and international interest, and they are considered by Congress to be essential background material for Congressional investigations and legislative proposals (UPA promotion literature).

The historical set of seventeen reels of CRS studies (1916-1974) sells for $850 with yearly updates of 6 to 13 reels selling for $440-$750.

Aside from considerable chagrin that a vendor has been able to put together a full set of CRS Reports and Issue Briefs for sale to the public, CRS staff express some specific concerns about current procedures:

1. Inflated public expectations: CRS products are a bit like forbidden fruit. Those who know of them, but are denied access, expect them to be much more than they really are. As one CRS staff member put it:

> We do good work around here, but most of our reports are simply summaries of what is in the best of the public literature. We provide Congress with executive summaries of public sources and issues in an organized and straight forward manner. Little of what we do could not be gained from other sources in some form. The problem with public access is getting the public to realize what our material is not.

2. Distribution of outdated materials: CRS products are constantly being updated. A vendor creating a set of CRS materials at any one point in time is essentially providing a "snapshot of a moving picture." The report a researcher might find on microfiche from a vendor could well have been superseded by numerous updates. As one CRS staff member expressed it "we have lost control over the pirated copies and put our credibility in jeopardy. It would be better to work out a distribution with a credible source over whom we have some control."

3. Cost: Some CRS staff indicate concern that the public has to pay twice going through a vendor when they could get the material free from their Member. This becomes a double insult when the material available is not the most current.

The vendors assert that they are providing a useful service and argue that the CRS position of adequate public access breaks down since it is so difficult from outside Congress to find out what CRS has available. Their indexes are the value added product which makes access possible.

CRS currently does not assume any responsibility for materials sold by private vendors and points out that should it be required to make such materials available to the general public or vendors, it would be far more difficult to disassociate itself from them.

ISSUES ASSOCIATED WITH BROADER PUBLIC ACCESS TO CRS RESEARCH PRODUCTS:

While not unsympathetic to the "public's right to know", CRS expresses the position that maintaining the ability to serve Congress exclusively is both a necessity and reflects the explicit and implicit wishes of the Congress as most recently mandated in Senate Resolution 396 (96th Congress, 2nd Session) and H.R. 4587 (100th Congress, 2nd Session) (September 1988 CRS comments on draft contractor document). A number of specific fears surface when it comes to disseminating CRS materials more broadly.

Diminishing the Quality and Utility of CRS Research: CRS prides itself in responding to the unique needs of the congressional environment. As one CRS staff person put it:

> CRS is unique among the support agencies in that researchers clearly put their name on each of the products to encourage a personal dialogue between the information requester and the information provider. Public access could upset this approach. CRS analysts specifically negotiate with original requesters making clear the extent and depth of analysis they can expect given the time and resources available. Analyses remain the property of the requesting Member or committee until explicitly released for broader distribution within the Congress. Many reports are not intended to be the kind of exhaustive scholarly analysis researchers would want to be distributed for peer or public review. Outsiders may well not understand the unique needs of the Congress and/or the limitations under which the analysis was done. Realizing the potential for public access, CRS analysts may begin writing to a different audience and thereby reduce the utility of the end product for congressional needs.

To the degree that time constraints and confidentiality allow, CRS analysts do seek outside comments and peer review. It is felt that analysts anticipating more extensive extensive peer or public review are unlikely to be able to provide analyses in a timely manner nor in the kind of format most useful to the Congress. CRS management asserts the necessity for CRS to control outside input "so that our products are enhanced without diminishing our effectiveness."

The conventional wisdom within CRS is that broader public access would change the way in which CRS analysts write and reduce the utility of their analyses for Congress.

A counter argument that wider access would actually improve analysis emerged from an intensive 1978 study of CRS carried out by task forces including both Library of Congress staff and outside experts. Their conclusions included the assertion that CRS analysts are handicapped by the current dissemination process. Since much of their efforts are never generally published and those that are show up in a random set of committee prints and other government publications, their work is often lost to the literature of science and public policy. These circumstances "isolate Congressional Research Service staff from professional colleagues elsewhere. The absence of a more regular mechanism of publication deprives them of the beneficial effects of peer review and of critical dialogue in professional journals." Broader dissemination of CRS material would improve the quality of the work provided to Congress and would encourage a broader range of scholars to consider full or temporary employment (see Cole, 1978, pp. 249-250).

The analysis also concluded that :

> To the maximum extent possible, the Library should make available to the media CRS reports and other products of research conducted by LC specialists. [CRS] reports are of special interest to the [task force] group, as subjects are timely and well researched and the data is current (Cole, 1978, p. 227)

and

> We believe that the Library can make a persuasive case that giving the American people access to selected CRS data bases and studies will not only in no way injure our service to the Congress, but will in fact encourage and improve policy research being carried out elsewhere (Cole, 1978, p. 98).

An earlier study by the Commission on the Operation of the Senate concluded that:

> the norms of science, including social science, embrace publicness, peer judgment, and exchange of information....To a considerable extent, CRS norms conflict with these norms of science...[this contributes] to the somewhat insular attitudes and practices of CRS researchers...CRS research is not seen by many other researchers...This fact inhibits the exchange of criticism and of ideas and data among CRS researchers and other researchers....CRS should be authorized and directed to...encourage dissemination by CRS of nonsensitive information to other researchers in appropriate forms (U.S. Congress, Senate, Commission on the Operation of the Senate 1976, pp. 23-24)

To a degree, CRS takes and inconsistent position when it comes to the potential impact of public access. While asserting the potential dangers of public access, spokesmen--often in the same breath--point out that extensive dissemination already takes place:

> Our obligation to provide services to the United States Congress places limitations on the extent to which we can make our products available to the general public. Nevertheless, much of the work of the Service eventually finds its way into the public domain through various channels (Gilbert Gude, former CRS director quoted in U.S. Congress, House, Committee on Science and Technology, 1979).

It is not a very strong argument that CRS analysts currently feel insulated from public or peer evaluation. Since CRS products are directly available to a wide and diverse congressional audience (with a potential of over 30,000 employees) and all analysts recognize that congressional offices serve as direct conduits for a relatively wide public audience, it is hard to imagine that wider dissemination would have the "chilling and reformulation" impact some observers project. The current commercial availability of microfiche versions of these reports may well make the entire hope of protecting the analysts a moot point. The answer to the concern of the professional analysts that their work will be misinterpreted (thereby encouraging them to adjust their analysis) lies in clearly identifying the limits of CRS products as "working papers designed to support the legislative

process", rather than selectively limiting access to those who can afford to pay or know how to tap their congressional office for copies.

Impact on CRS workload: The spectre of CRS becoming the "policy research arm of the nation" engenders fear among CRS staff concerned with handling the current avalanche of requests. CRS does not have the duplicating or distribution budget or staff to directly service the general public, and should not be expected to.

Opening a dialogue with users outside of the Congress is viewed as generating more demands on CRS. As one CRS analyst explained:

> Public access is an invitation to public reaction and comment. We get enough calls and letters already from within Congress. Now [with broader public access] we would have to explain ourselves to all the interested parties. This is not the kind of thing a clerk could do, so the time of senior analysts would be taken away from their jobs.

CRS management argues that:

> Authorizing direct public access to CRS products would inevitably affect the Service's attitudes, priorities, resources, and, ultimately its effectiveness in serving Congress. The Service's limited experience in direct dissemination to the public suggests that very strong pressures exist that could well lead to a "customer/provider" relationship in fact, if not in official policy (September 1988 CRS comments on draft contractor document).

The problem of increased demands is also expressed in relation to information in electronic forms. A general problem with providing tapes to outside users stems from the expansion of the number of "customers" feeling that they have a stake in the content and capabilities of the product. Congressional users are constantly making suggestions as to how CRS could improve its electronic products to better serve their interests and their increasing sophistication in searching for needed information. If public users (or vendors)have access, they might expect their own enhancements, which could overburden CRS staff and may well make the product less usable for the Congress. As long as access is limited to duplicating existing tapes as a by product with no expectation of a "customer/provider" relationship, access would not be disruptive.

Legal Problems: CRS distributes some materials such as copies of articles and booklets along with the material it produces originally. The Info Packs, for example, are like file folders filled with reprints. As former CRS director Gilbert Gude expressed it:

> Because CRS' audiences are generally limited to the congressional community, the Service can supply materials to the Congress which might not otherwise be readily available, due to limitations imposed by the copyright laws. Any widespread dissemination of hitherto restricted CRS reports to the public would necessitate elaborate, costly, and time consuming procedures to ensure compliance with

copyright requirements (quoted in U.S. Congress, House, Committee on Science and Technology, 1979, p. 35).

Congressional Policy Limiting the Dissemination of CRS Research Products: Through the appropriation process, Congress has been rather explicit about prohibiting CRS from using any of its funds for "publication or preparation for publication." (H.R. 4587/ 100th Congress, 2nd session)). Any deviation from this limitation has required explicit waivers from the oversight committees. Electronic versions of CRS material have consistently been viewed as "publications" for the purpose of including them within this constraint.

Both Houses of Congress have asserted the CRS research falls under the custody and control of Congress and are subject to the Speech or Debate Clause of the Constitution. S. RES. 396 (96th Congress, 2nd Session) states:

> Whereas, memoranda of the Congressional Research Service are in the custody and under the control of the Members and committees for whom they have been prepared, and the Congressional Research Services has no authority to release them to anyone outside the Congress (p. 2)

While some CRS staff are amenable to sharing their information much more widely, the impetus is not likley to come from CRS. The last time CRS took the initiative to spread its materials more widely (1978), it was explicitly chastised by the Joint Committee on the Library. In response to a pilot project in which CRS information would be shared with state legislatures in exchange for some of their information, the Joint committee turned down the request arguing that "CRS can't serve two masters" and "information is power." In turning down the request the Committee on House Administration concluded:

> We believe that it is important, when considering the release of Congressional information and data, to remember: (1) that the release of information (other than that required by law) by any legislative branch agency, sets a precedent not only for other such agencies, but for both bodies of Congress as well; (2) that the Library of Congress, as a legislative branch agency, bears a special relationship to Congress, and (3) that there are very practical concerns relating to the various sources of/and contributors to congressional data bases (letter from Representative Frank Thompson, et. al to William Welch, Deputy Librarian of Congress, November 6, 1978).

As more than one CRS staff member indicated, "you won't find any open advocates of public access to CRS materials around here. We tried it once and got burned."

More recently in making an exception for the publication of CRS's Major Legisltion of the Congress, the Joint Committee on the Library asserted that:

> We affirm congressional policy that the circulation of CRS materials prepared specifically for congressional use be limited to the Congress...CRS and its oversight committees should consider the publication of only those CRS products whose

release to the general public would be compatible, both in terms of cost and product content, with CRS's obligations to the Congress (letter from Senator Claiborne Pell, et. al., March 21, 1981).

Impact on Congressional Offices: Alternative methods of public access to CRS materials will change the level of demands for information placed on Member offices and the degree of political "credit" they can accumulate by satisfying those demands. Between 10% and 20% of constituent letters request policy information (Frantzich, 1986, pp. 23 and 40), and many of them can be satisfied with CRS material. If new dissemination procedures allow constituents to bypass the congressional offices and get material more efficiently and at no more cost, Member office effort and credit will be reduced. If new dissemination procedures increase public awareness and demand for CRS materials and maintain the congressional office as an integral part of the process, effort and credit will go up.

Equity of Access: Access to CRS products represents a clear case of information inequity. Outside of Congress, individuals and organizations "in the know" get the materials as a matter of course through their congressional office, while the bulk of potential users either do not know it exists or do not know how to get it. If we assume that CRS products are useful for framing the background of key public issues and serve as a grounding for impending debate, the fact that some participants have the background material handed to them and others must not only develop their own background material, but also guess what the others are privy to reduces the equity of potential impact.

CRITERIA FOR EVALUATING PUBLIC ACCESS TO CRS RESEARCH PRODUCTS

Timeliness: The importance of timely CRS research material varies with the audience. For participants in the policy process, having timely access to some of the material which frames basic policy issues while they are being debated is quite important. For the academic or general researcher attempting to understand an issue area or development of a particular policy, timeliness is less important.

Comprehensiveness: As selected analyses, CRS reports are not intended to be comprehensive. The importance of comprehensiveness relates more to the availability of complete and up to date indexes allowing one to determine what is available.

Searchability: While full text searching of CRS products would allow one to determine analyses not clearly indicated in the title or index terms, an adequate and well designed index would serve most users' interests. The availability of an on-line searchable index (of no more complexity than the current CITN file or the planned "Guide to CRS Products") would serve the purpose.

Costs: The types of users potentially interested in CRS products would probably be willing to absorb modest costs for their use. Those most offended by charges would be those currently knowing how to get free copies.

Archivability: Full utility of CRS products would not be reached unless they could be archived. While the volume of its reports is impressive, it is not so great as to be unmanageable, even in hard copy form.

Flexibility: Not a significant consideration

Public Access: While CRS products are never going to be best sellers, current inequity of access means that some "players" in the policy process have easy access to the background material from which policy emanates, while others start at a disadvantage.

APPROPRIATE FORMATS FOR EXPANDED DISSEMINATION OF CRS RESEARCH PRODUCTS: The decision as to whether CRS research products should be distributed more widely and the appropriate vehicle for such dissemination depends to some degree on the particular product.

Info Packs: CRS currently distributes throusands of Info Packs comprised of CRS reports, reprints of the Congressional Record and copies of copyrighted materials for which permission to reproduce has been obtained. Similar to a clipping file on key issues, these materials could be advertised more widely, distributed free to the depositiory libraries and/or sold through GPO. Wider distribution could reduce the willingness to copyright holders to give their permission to include their materials. Eventually as print on demand capabilities emerge the electronic sections of the Congressional Record could be merged with electronic CRS Reports and Issue Briefs to create tailored products for GPO distribution (both on a sales basis and for congressional office distribution). To the degree that congressional offices maintain their role of alerting constituents to CRS materials and serving as a conduit to their access, procedures such as that developed by the CRS Library Services Division should be followed. It makes little sense to "buck" requests to CRS (or GPO), have the document physically returned to the congressional office and then be redistributed. Offices could retain the same political credit by having CRS or GPO directly distribute the material after a phone or electronic mail request from the congressional office with a notation or stock letter indicating the material was forwarded "compliments of congressman x". A monthly report of products delivered to constituents of each office would serve the record keeping and mailing list development needs of the congressional office.

If wider dissemination of CRS products is agreed upon, Congress will eventually have to determine the degree to which it wants to maintain its own role in directly distributing those product to individual requesters on a free basis. For most of the public, the service provided by congressional offices lies more in making them aware of information products and providing access to products denied to them directly, rather than the fact that these products are free. Without any great reduction in public support, congressional offices might well serve the public's need by continuing their informing process, but not providing the free documents. The public is beginning to appreciate the cost of information and would understand being referred to their local depository library or to GPO once the congressional office has helped identify the document and specified how to get ahold of it.

CRS Reports: The current wide dissemination of CRS reports belies the argument of their political sensitivity. If such a concern persists, delayed distribution of CRS reports (2-3 months) to the depository libraries and for sale by GPO would be warranted. Given the "work in progress" nature of these reports, existing photo duplication procedures should be

maintained without retaining large stocks of individual reports.

Since all CRS reports are currently developed in electronic form, tapes (or sets of the word processing disks) of the collection should be sold to vendors to determine the existence of a market. Since word processing disks are not currently centrally archived, CRS would have to create an archiving procedure either on disk or by loading the disks on a tape. Such an archive is a good idea for the long term interests of CRS above and beyond any question of public access.

Vendors wishing to continue dissemination of microform copies should be given direct access to the collection rather than having to create a set of "pirated" copies. By facilitating outside use, CRS could retain some quality control over the products.

No matter what the format, contracts for purchase of CRS materials should require explicit statements defining the limits of CRS products ("working papers in support of the legislative process") and require periodic updating of electronic formats or issuing of more timely microforms as revised versions appear.

Modes of congressional use of CRS Reports and the constant updating mitigate CD-ROM as an appropriate format for use within Congress. For public use, periodic updates are satisfactory making CD-ROM a highly useful format given its searchability and archivability. Retention of CRS materials on CD-ROM seems most appropriate for the private sector, but use of this format should include a procedure for depository library (and therefore public) access.

Issue Briefs: The Issue Briefs are the most appropriate CRS products for wider public distribution since they provide timely and summarized information on the issue of current concern to the Congress. As long as users are clearly warned that these documents have a relatively short shelf life due to their constant updating, access would provide users with the context and background within which Congress is debating key issues. Hard copies or microforms should certainly be made available to depository libraries. GPO sales of numerous short issue briefs is probably not economically viable, but sets of Issue Briefs on similar topics bound together would provide a product for which the costs of distribution could be recovered. To the degree that print on demand capabilities develop, these packages could be developed based on individual orders. The greatest promise lies in broader electronic dissemination of Issue Briefs. They are short enough for on- screen viewing and remote printing. Sales of Issue Brief tapes as a byproduct to vendors for on-line, CD-ROM and/or microform distribution seems appropriate, again as long as the general public is protected through arrangements to service the depository libraries.

Selective Dissemination of Information/ Optical Disk Access: Selective dissemination of information as a general research service of CRS is one of those special services which goes beyond the realm of the public's right to know. The timely updates needed by staff working on a day to day basis in a particular issue area is not the same as the needs of most researchers. CRS could expand its public service by creating sets of subject matter bibliographies every six months or so using the existing SDI technology, but this would

clearly go beyond its direct role of serving the Congress. To the degree that CRS and LOC data bases (see below) were made available to vendors, this is the kind of service they are best able to promote and provide. In the relatively near future, such hard copy bibliographies in which contents are categorized by only one index term at a time will increasingly pale compared with the multiterm searching capabilities of computerized data bases.

Using optical disk technology and software to both search and retrieve full text of hard copy documents offers some exciting possibilities, but contains some significant problems. Using optical scanners to capture the full text of materials and then bypassing the original source in the distribution process introduces some knotty problems if the optical disk project goes beyond in-house use. Publishers and authors will expect protection of their copyright and some form of royalties to compensate for reductions in sales of the hard copy (see Thorin,1986, pp. 42 and 45). The major cost of disk production involves developing the master collection (either in analog or digital format) producing the master disks ($3-$5000) and creating duplicate copies ($20-$30 each).

Optical disks sound like an exciting and cost effective way in which libraries could reduce storage costs and increase client responsiveness, but signifiant legal implications will have to be worked out in relation to intellectual property.

Beyond the legal and cost questions are a set of technical problems. Technology is changing so fast that it is hard to settle on one format. Some inside the LOC argue that "the optical disk project served an important role in trying out an emerging technology, but it has been overtaken by new technologies--both in terms of new optical disks and CD-ROM-- which are both cheaper and more efficient to produce and search."

Indexes and Data Bases: Allowing access to CRS products is a largely meaningless gesture unless the public has a way to find out what is available. Broader distribution of the hard copy Guide to CRS Products and the Update to the library community in general with clear indications of ordering procedures would undoubtedly increase demand. The availability of indexes and recognition that routes to public access exist would encourage the inclusion of CRS products in commercial indexes and data bases (such as PAIS and the GPO monthly catalog).

Electronic indexing information could be made more available as a byproduct of the existing CRS data bases. As one staff member outlined both the dangers and opportunities:

> Direct access to the CRS BIBL file [or the impending "CRS Products File"] poses some logistical problems. Direct dial- in access would overwhelm our computers and reduce our service to the Congress. Providing the tapes to vendors would cause little difficulty for CRS, but vendors would have to make some important decisions as to how current they wanted the material. CRS updates its tapes each night, but vendors would probably neither need nor want such frequent updating.

Another staff member pointed out:

The CITN file introduces a particular problem for public access. While the other CRS files (Bill Digest,CRS Reports, etc.) are unique data bases, CITN is a more timely and legislative branch oriented equivalent of commercial data bases such as PAIS (Public Affairs Information Service). Providing the CITN tapes to outside vendors would subsidize commercial competitors to PAIS.

The problem of competition with the private sector will evaporate soon as CRS products are isolated in a separate data base, and would include information not currently available through any commercial service.

Above and beyond biblographic data bases, the Bill Digest Office also develops a substantive Terminated Programs data base, by culling out all enacted legislation indicating a termination date. It is designed to alert each committee of the programs under their jurisdiction which will expire without some action. This data base seems to be limited enough that extensive efforts to enhance public access does not seem to be warranted. The public interest probably would be served by making the public aware of the availability of this information and by directing committees to disseminate such information by request.

Summary: It is difficult to determine the ultimate public demand for CRS research products, but many CRS staff echoed the statement that "we have just scratched the surface of those people who might find our work useful." Broader public access would help not only to equalize a system in which availability is highly dependent on "who you know" rather than reflecting actual needs, but broader awareness of the quality of CRS work would enhance public evaluation of Congress' bases of policy analysis. Allowing a broad range of dissemination procedures and formats assures that CRS research products will have every opportunity to find their niche in the information market place.

Explicitly Public Material

While there is considerable debate over the public's right of direct access to the above CRS research products, CRS has been explicitly granted permission to distribute printed copies of some congressional material and indirectly encourages the production of other material (See Table 1).

CONGRESSIONAL RECORD INDEX: CRS indirectly subsidizes a Congressional Record Index as the prime customer of a vendor. CRS contracts with the vendor to create a timely abstracted index of the Record which is made available on-line via SCORPIO. Unlike the GPO version which comes out every two weeks, the on-line version is available the next afternoon. While CRS is the prime customer for this service ($110,000/ year), the vendor also sells a hard copy version ($180/yr) and on-line via Dialog. The arrangment saves the government money, but raises some questions concerning subsidies to commercial enterprises.

CRS has recently contracted for a pilot expert system to do indexing using syntactic analysis and will evaluate the potential for automating abstracting and indexing.

Table 1 Public Distribution of Congressional Research Service Products

Product	Frequency	Subscriptions (Cost)	Depository Libraries
CRS Review	10 issues/yr	250 ($9.50)	1042
Major Legislation of the Congress	5 issues/Cong.	450 ($25)	1157
Digest of General Bills and Resolutions	annual	200-250	1000+
CRS Studies in the Public Domain	biannual	81 (discontinued)	920

The CRS Review is published 10 times per year. It includes discussions of current issues written by CRS staff. Above and beyond distribution to Congress, it is made available to depository libraries free and on a subscription basis. As outlined earlier, public subscribers are introduced in the Review to new CRS products which they can not directly acquire under present rules. No major changes in the dissemination of the Review are either being discussed or seem warranted.

Major Legislation of the Congress is published five times each Congress and includes summaries of key legislation. It originally was created automatically be selecting a specified field of the full text CRS Issue Briefs currently on-line. During the interim period with only Issue Brief summaries on-line for newer issues, the production of the MLC involves some patchwork inserting of full text material from other sources. The MLC is distributed on a subscription basis by GPO and free to the depository libraries. Broader dissemination of the MLC would involve the same procedures as discussed in the previous discussion of Issue Briefs.

CRS Studies in the Public Domain had been published every six months since 1979, but has been recently discontinued. It included listings and descriptions of CRS analyses which had been included in committee reports and in the Congressional Record.

The last time public access to CRS materials was explicitly discussed in Congress, CRS Director Gilbert Gude agreed to "seek the necessary authorization for the preparation of a periodic publication listing all CRS reports currently available to the general public" (U.S. Congress, House, Committee on Science and Technology, 1979, p. 37). CRS Studies in the Public Domain was printed and distributed twice a year to depository libraries and via subscription until 1986. CRS distributed individual copies to the public requesting lists of all CRS products. As one staff member put it, "It was a nice polite out. We could say that although we can't give you the documents or a catalog, here is what is already available." In another staff member's words, "it was a bone we could throw to the public to improve our poor public image of always having to say no." The publication was never a big seller (See Table 1) and was dropped in 1987. With limited funds, the CRS Products Committee felt that it did not warrant the $1000/year it cost to publish, particularly since it did not directly support congressional offices. It was also argued that the kinds of material showing up in the document could be searched using the CIS index and indexes to the Congressional Record

Dropping CRS Studies in the Public Domain is clearly a step backwards in terms of public access. It makes public awareness and access, even to those products clearly agreed on as useful to the public, one more step removed from their use. The modest cost does not seem to warrant its discontinuation, and serious thought should be given to its reinstatement. The dropping of this document reflects CRS hesitancy to publicize or encourage public use of its products. This attitude was revealed by the curiosity and moderate chagrin staff members expressed concerning the GPO pamphlet CRS Publications Available to the Public. While limited to only those products (the MLC, CRS Review and Digest of General Bills and Resolutions) for sale through the Superintendent of Documents,

CRS staff indicated that it was clearly outside their realm of responsibility to promote their own products.

The Digest of General Public Bills and Resolutions has been published in printed form since 1935. This annual set of bill summaries has been superseded for congressional use by the on- line version which is part of the LEGIS system. The Digest is a clear case of how new technology can reduce public access. When it was used as a primary source for congressional office research, the Digest was published five to ten times per year, now that the hard copy is more a a by-product and the on-line version the working "document", publication has been reduced to once a year.

There has been considerable interest among some vendors and oversight committee staff in making the electronic version available to the public. In the early 1980's, when HIS originally suggested that they make it public, the issue got caught in a turf battle. As one participant put it, "The Senate opposed it because the House was for it." Later talks with the commercial vendor Legi-Slate broke down when a quid pro quo exchange plan was viewed as giving unfair advantage to one vendor over another.

Serious consideration of making the bill digest information more readily available to the public revolves around selling tapes as by-products of the existing in-house on-line service, rather than expanding access to the printed format or pursuing another format. The importance of timeliness for monitoring ongoing legislation mitigates against any other format than frequently updated CD-ROM. For historical purposes, few users would be interested in a full set of bill digests and would be more interested in the full text of bills. Bill digests are most useful for directing researchers to the bills for which they need a full text, rather than in and of themselves. Vendors are most interested in the bill digest tapes to meld with their existing bill status and bill text information to assure that they have the official descriptions.

There is little technical opposition within CRS to provision of the bill digest tapes. In the words of one staff person:

> The bottom line on access to the electronic versions of CRS products is that there is no technical reason for not sharing tapes with the public. The daily Bill Digest tapes are straight data tapes which could be run on any system. Unlike the Congressional Record tapes with their myriad of imbedded printing codes, the tapes CRS exchanges with the House, Senate and G.P.O. have not had the printing codes included yet... CRS reports are created from Word Perfect wordprocessing disks and would present little problem for outside use.

The opposition which exists stems from practical, rather than technical concerns. Those associated with the production and distribution of the Bill Digest point out a number of ways in which selling the digest tapes would make their jobs more difficult:

> -With public access there would be more pressure for timeliness. Currently there is a delay getting the hard copy of the bill so that it can be digested, with a particularly large backlog at the beginning of each Congress. "Those who want bill digest files

must realize that it is not instantaneous and comprehensive. There is considerable lag between the introduction of legislation and when the digests appear on line."

-Customers would demand user support, and we are shorthanded.

-Outsiders would not understand some of the unique characteristics of the bill digest data base. For example, although tapes are available for the 93rd-100th Congresses, they are not comparable. Different indexing schemes have been used over the years.

-Bill Digest files are updated nightly making it difficult for vendors to keep an up to date file available

Others in CRS point out that one can not talk about "the" bill digest tape since in the sharing between the House, Senate and Library different versions emerge. The LOC tape is most limited in the bill status stages included, but retains all the various drafts of digests reflecting changes in legislation over time. The House version includes bill status information down to the subcommittee level, but only retains the most current digest of a bill. The Senate version places more emphasis on tracing amendments, largely due to the role of non-germane amendments in that chamber. Making a marketable Bill Digest tape available may require some cooperative effort by the various congressional support units. If all vendors want is the text of the Bill Digest, CRS could simply make copies of its tapes. If, on the other hand, it was important to include cosponsors and/or bill status information, it would be necessary to merge the CRS files with those developed by the House and Senate. Since it is not entirely clear what the market will be, it might be most feasible to phase in access starting with the text of the digests first and then incorporate the additional material if a demand develops.

Some CRS staff question the way vendors go about promoting their products and have little desire to get in the middle of the battle:

> In the competition for customers, the vendors often promise more than they can produce. Products are advertised well before they are legally and/or technically available. Legis- Slate already has the CRS Bill Digest materials listed on their price list (arguing that the price reflects what they will charge "when the material becomes available"). Congressional Quarterly has protested this strategy to CRS, but intends to follow suit in their upcoming advertising to "thwart the Legi-Slate advantage."

The Bill Digest file seems entirely appropriate for sale to vendors and promises little real disruption of CRS efforts or additional costs. The broader question is the degree to which the public will have access to the data bases which include bill digest information. Like the previous discussions of Scheduling, Bill Status and the Congressional Record on-line, procedures must be established to provide public access to these data bases at a reasonable cost--probably through the depository library system.

The Library of Congress

Fully understanding the role of the Library of Congress as a producer and disseminator of information is well beyond the scope of this analysis which is focused on understanding the way in which information by and about Congress is disseminated to the public. The LOC plays a relatively limited role in relation to congressional information independent of the Congressional Research Service efforts outlined above. The following discussion of the LOC will point out those limited areas where it plays an independent role. Additionally, broader LOC dissemination patterns and experiences having potential implications or providing lessons for future congressional information dissemination will be outlined.

The LOC has long been viewed as an important national resource for serving the public's citizenship role:

> In a democracy that depends on the education of its people for the formulation of policy, the Library is poised to perform a vital public service. It lacks only the mandate (Cole, 1978, p. 226).
>
> Free access to ideas and information, a prerequisite to the existence of responsible citizenship, is as fundamental to America as are the principles of freedom, equality and individual rights. This access is also fundamental to our social, political and cultural systems (1982 Public Library Association Study quoted in Bearman, 1986, p. 23).
>
> The Library of Congress is the world's greatest single repository of human memory and thought with special links to the world's most important legislature. Uniquely among great national libraries, the Library of Congress was designed by and for its people as a whole and remains open to all comers (Librarian of Congress, James Billington, 1987).

Not only is the Library of Congress committed to open public access, but it has often been at the forefront of new technology in facilitating this access. From the early years of computerized indexes, to the provision of cataloging tapes and recent pilot projects with video disks, the LOC has attempted to increase the accuracy and timeliness of access while reducing its cost. Librarian of Congress James H. Billington promises to extend this commitment exemplified by his confirmation hearings statement that,

> By imaginatively using new technologies, for instance, we might aspire to share by the year 2000 much of the substantive content and not merely the descriptive catalog of this remarkable national collection with citizens and students directly in their local communities. Using new technologies boldly may enable us to become less preoccupied with the means and freer to pursue the ends of enhancing the direct interaction between people and ideas within and beyond the Library (Billington, 1987, p. 2).

DIRECT SUPPORT FOR DISSEMINATING CONGRESSIONAL INFORMATION

On-line Access

The LOC supports close to fifty public terminals in the major reading rooms giving anyone access to the book (LCCC), periodical (BIBL) and bill status (CG) files. Patrons can get free training sessions, individual consultation and the ability to freely print out their search results. The two bibliographic files include committee reports and published CRS, GAO and OTA studies as well as privately published literature (See Table 2). Citations for CRS reports which have not become part of committee publications are specifically denied to users on the public terminals with a notation that "THIS IS AN INTERNAL CRS DOCUMENT" and no bibliographic information is available. Commercial data bases available to congressional offices and internal data bases such as HIS' Congressional Record file are not available to the public. The CG (bill status) files are cut down versions of those available to congressional offices, focusing on bill digests and major floor action. Technically, public users (actually anyone in the Library) are not accessing the same data base as congressional offices. The LOC maintains a separate set of data bases so as not to interfere with the response time for congressional offices. The major limitation of these services is that they are available only to individuals in Washington D.C. Since the LOC is the one congressional agency with its own versions of all the basic legislative data bases and considerable internal experience serving as a tape vendor (cataloging tapes), it would be the obvious choice among the congressional support agencies to prepare the tapes and provide them for sale through GPO. Direct on-line access to the SCORPIO files by the depository libraries should be attempted on a pilot project trial basis to determine the level of demand and unanticipated consequences. Since the LOC files are separate from those used by congressional offices, a pilot project using a limited number of libraries would not interfere with congressional use. Aside from making these data bases available commercially from the LOC or through a vendor, or giving the depository libraries direct access, some expanded ability to serve the public's need for information would result from making these data bases available to the press. As the 1978 task force put it:

> We urge the Library to consider the possibility of offering computer services and the use of its data bases to the media. Local media representatives in Washington, D.C. would particularly benefit from access to the Congressional Record and Legislative Index data bases, and the Library might consider a pilot project to place terminals which access these data bases in the House and Senate galleries (Cole, 1978, p. 228).

Table 2 Congressional Support Agency Reports Cited in the Public Bibliographic Files of SCORPIO

	LCCC File	BIBL File
Congressional Research Service	415*	828
General Accounting Office	2,656	5,688
Office of Technology Assessment	293	364

*Figures include citations listing the support agency as the "corporate" source as of November 2, 1987. Internal CRS documents not available on BIBL are not included. The same items may show up in both files.

Direct Public Inquiries

The staff in the main reading room handle numerous in-person, mail and telephone inquiries. They will help the public find the most appropriate source of the information they require. Significant effort is made to direct them away from the LOC to public and federal depositiory libraries for general items.

The Documents Expediting Project

The Documents Expediting Project is a centralized acquistion service for obtaining U.S. Government publications which are not designated as depository items and not available for sale. Subscribing libraries pay a fee for the service. Congressional committee documents make up a significant part of the documents distributed.

SOME POTENTIAL LESSONS FROM NON-CONGRESSIONAL INFORMATION DISSEMINATION PROGRAMS OF THE LOC

The LOC does much more than serve as the lending library for the Congress and provider of on-line information services for congressional staff and Members. It serves as a multi-faceted preserver and disseminator of culture and knowledge.

The LOC as a Publisher

The Library of Congress Publications Office has two parallel printing programs, a regular book and pamphlet publishing operation and a card and gift collection developed and distributed without the use of government funds. Appropriated funds are used to produce guides to library collections (i.e. Antarctic Bibliography, Civil War Manuscripts, etc), directories (i.e. Popular Names of U.S. Government Reports, Historic America: Buildings, Structures and Sites, etc.), technical guides (i.e. Boxes for the Protection of Rare Books, Matting and Hinging Works of Art on Paper, etc.) and other books and pamphlets which "highlight and illuminate the LOC collections." While a number of these books contain a great deal of substantive material and would inform a reader in much the same way as any academic book, the LOC will not publish it unless it in some way focuses on a LOC collection.

The regular LOC publishing program is required to go through GPO to contract printing. Sales are handled by the Superintendent of Documents. The publishing office delivers materials either in manuscript form or, in some cases, camera ready from an in-house desk top publishing capability. LOC publications are advertised through the Superintendent of Documents listings with promotion supplemented by two catalogs. The Library of Congress Selected Publications is published yearly to highlight new and potentially popular offerings. Thirty to forty thousand copies go to those on in-house and rented mailing lists of libraries, selected academics and other individuals. Orders go through the Superintendent of Documents (SubDocs). A more extensive catalog of Library of Congress Publications in Print goes to more selected mailing lists with approximately 10,000 recipients. Both catalogs

are distributed to all depository libraries. Neither catalog lists CRS publications such as the Digest of General Bills and Resolutions, Major Legislation of the Congress, or the CRS Review, but for some unknown reason the Congressional Record is listed in Publications in Print.

The Law library publishes its own set of free paperback titles such as: Drunk Driving Laws in Various Countries, A Guide to Official Gazettes and Their Contents, The American Constitution: Its Global Heritage. These are sent free automatically to 128 libraries and research institutes. Individuals may order individual copies free or purchase them through SupDocs.

Gift and Card materials are printed with private funds through a trust fund arrangement. These posters, cards, records, selected books, etc. are designed more for tourists and gift giving. The LOC contracts printing directly and promotes the collection through a separate catalog sent to over 100,000 previous customers and individuals of rented lists. Distribution is done through over the counter sales and by the LOC Information Office and not the Superintendent of Documents. Book materials show up in the Publications in Print catalog with a notation to contact the Information Office.

In disseminating traditional printed materials, the LOC augments the Superintendent of Documents promotion with extensive direct mail techniques. LOC staff see the two methods of promoting products as complimentary. "The SupDocs material reaches some people we would never get to and vice versa." The LOC Publishing Office has found a way of actively promoting their materials without decentralizing ordering and delivery. This maintains centralized bibliographic control.

Video Disk Production

Since 1983, the LOC has had an optical disk pilot project exploring ways in which optical disks can be used for storage and retrieval of information both within the library and for the broader public. Underlying the optical disk project was a consistent theme of supporting public users and producing products for external distribution. As the final report stated:

> Public service should be a major consideration in all phases of adopting optical disk technology to the Library. Any optical disk products should benefit internal Library operations as well as satisfy an external need. Such products should represent unique Library collections, combinations of materials particularly suited to optical disk technology or large fields of data, with emphasis on retrospective rather than current materials (Hahn, 1987 p. 5).

The pilot projects highlighted some issues which must be taken into account when dealing with optical disks, especially if they are to become a product distributed by the LOC (or for that matter any government agency):

> -General availability of necessary hardware among potential customers must be considered (Hahn, 1987, p. 5)

-Attempts must be made to avoid competition with the private sector to avoid duplication (Hahn, 1987, p. 9). More specifically, the task force recommended that "when considering the production of optical disk products...emphasize retrospective...rather than current material, which may more and more be handled quite adequately by the private sector (Ibid., p. 20).

-Intellectual property rights must be protected, but will require new procedures. (The report discusses at length how copyrights could be protected for disks used within the Congressional community, or when prints are made directly from disks controlled by the Library, but does little to clarify what would happen if the Library began to sell disks which included copyrighted material to others) (see Hahn, 1987, pp. 10-12).

-The storage of material on a disk does not lessen the need for bibliographic control.

The LOC video disk task force clearly identified congressional materials as good candidates for optical disk inclusion:

> Optical disk products produced for external consumption should benefit Library operations as well as meet an external market need....As an example, some Library collections are notoriously difficult to control and manage (e.g., official gazettes, House and Senate Reports, etc.). Having this material on optical disk could help enhance the Library's management of these collections, and there could be a market for this material on the outside (Hahn, 1987, p. 19).

With one exception, the optical disk pilot project has resulted in products exclusively for internal Library use. The exception did not deal specifically with congressional information, but provides some important insights.The American Folklife Center attempted a major foray into new technology with the production and commercial distribution of an interactive video disk on the American Cowboy (The Ninety-Six: A Ranch in Northern Nevada). The disk was an outgrowth of a major exhibit at the library and includes thousands of indexed still photographs and motion picture clips. Search software allows access to segments identified by keyed index terms. As a distributed product the disk has had limited success with only 40-50 sold in the last four years. Intellectual property rights issues were avoided since all of the included material was the property of the LOC. The specialized subject matter, the lack of video disks in many classrooms and LOC's limited experience in marketing strictly educational material all contributed to the limited distribution. As a byproductof an LOC exhibit, the cost to assemble the original material ($50,000) and the mastering of the original disk (under $5000) should not be included in the cost. By selling the disks at $150 to compete with other commercial video material (films and filmstrips) the LOC hoped to encourage the spread of video disks in the classroom and to recover the marketing costs. Copying the disks proved to be relatively inexpensive ($20-$30), but printing a small volume of the printed guide and packaging the set in an attractive box added significant costs.

Services for the Handicapped

The National Library Service for the Blind and Physically Handicapped (NLS) translates books and periodicals into braille and recorded editions more accessible to handicapped. The NLS serves as a manufacturing and distribution operation for existing printed materials. Braille and recorded publications are sent to a network of regional libraries independent of the depository library program from which eligible individuals can borrow both the materials and playback equipment. Very little government information and no congressional information is translated directly into these formats. (for a fuller discussion see Nezzo, 1987).

Cataloging Services

The LOC Catalog and Distribution Service publishes bibliographic cataloging aids for libraries. They have adopted new technologies as the demand grew. Initially much of their effort lay in producing card catalog cards and hard copy indexes. They moved to microform distribution as that became available, and have been selling computer tapes for twenty years while currently producing some bibliographic material on CD-ROM. Their experience of applying a variety of formats and dissemination procedures provides some insights for other congressional support agencies as they make similar decisions and traverse technological change.

The LOC was the primary provider of printed card catalog cards, but the volume has declined greatly as private vendors have taken LOC information and added value by tailoring cards to the needs of particular libraries. Currently bibliographic records are sold via hard copy indexes, microfilm and computer tapes. Libraries can either order the MARC (Machine Readable Catalog) tapes directly, or use one of the membership utilities such as OCLC (over 6000 members) or RLG. While the LOC is the major provider of information, member libraries can input data to expand the data base.

Motivated by the need to service remote LOC operations overseas, the Catalog and Distribution Service is in the process of developing a CD-ROM version of the machine readable catalog. The size of the catalog has led to some difficulties since it will require seven disks which need to be searchable simultaneously. Two four drive systems with a daisy chain capability will be required. The LOC is using an outside vendor to develop the system, provide the retrieval software and provide user support. It is expected that the disks will be sold, with the vendor receiving a royalty. CD-ROM is proving to have the following capabilities at the LOC:

-CD-ROM is excellent for static records, but there is no no method of user updating, correcting or customizing

-CD-ROMs are equivalent to other electronic versions (tapes) at the time they are produced, but it is expected that they will not be provided as frequently. Thus, after a few weeks CD-ROM will be less timely.

-CD-ROM will reduce telecommunications costs, an especially heavy burden for small libraries using services such as OCLC.

-CD-ROMs will put a new equipment, supervision and training burden on libraries.

-For the purposes of pricing, CD-ROMs fall under the standard legislation allowing sales at cost plus 10%.

-Few participants see CD-ROM as a replacement for other formats, but rather as augmenting them.

The LOC has no special arrangements with the depository libraries and treats them like any other customer. Since a large portion of the Catalog and Distribution department's budget ($5 million of $8.5 million) comes from the sale of products, they are a bit worried that new government information policies providing material to the depository libraries free for which they have been paying, will undermine the Catalog and Distribution revenues.

The General Accounting Office (GAO)

THE ROLE OF GAO

The General Accounting Office serves as Congress' auditor, although its role has expanded well beyond the traditional auditing of books to evaluate the degree to which programs are broadly carried out to reflect legislative intent. Requests for studies generally come from committees and often include the social, organizational, and technical as well as the financial aspects of programs. GAO sees itself as congressional support staff first and foremost. In the words of one spokesman:

> Our primary task is to work for Congress, and we make no pretense to serve the public directly. Reports to Congress are generally embargoed for thirty days and dissemination may be held up for a longer period at the behest of the requesting committee. Once released by the requesting congressional committee our reports are available to the public. We play a somewhat different role than a more basic research agency such as OTA. We play the role of "stool pigeon". If we do our job right, we are finding out what is wrong rather than discovering what is right.

In 1976, a report produced by the Commission on the Operation of the Senate concluded:

> Unless the [requesting] committee or individual Member acquiesces, the report is not made available for further distribution. Hence, regardless of the nature of the findings submitted by the Comptroller General, the report can be kept, not only from the public, but even from other committees or Members of Congress until such time as it is released by the committee or Member who had originally requested it. This practice has continued despite the fact that sections 232 to 234 of the Legislative Reorganization Act of 1970 provides for making GAO reports generally available to committees and Members (U.S. Congress, Senate, Commission on the Operation of the Senate, 1976, p. 49).

CURRENT DISSEMINATION PRACTICES

GAO research results in a variety of products, from fact sheets and briefing papers, to full blown reports. Reports are the standard documents made available outside of Congress. GAO has standardized word processing with Word Perfect, so all reports exist in electronic form. Short reports (under 60 pages) use an outside contractor for electronic composition and are printed in house. Generic typesetting codes are imbedded in the word processing disk and the document is sent electronically to a computer in Minneapolis, It comes back as pages the next day with an automatically generated index. Longer reports and those where there is considerable lead time are sent to GPO for printing. GAO staff point out that "the tight turnaround time requires considerable control over our own printing." The size of the printing run is determined by the mailing list and a judgement call of public interest. Some topics such as energy and medical malpractice have a "track record" of high demand, and GAO orders larger print overruns.

GPO reports are distributed to a mailing list of interested parties suggested by report authors. Depository libraries automatically get copies of all GAO reports if they wish. The Superintendent of Documents maintains a sales and distribution outlet in the GAO offices which handles in person, mail and telephone requests. The first five copies of any report requested by an individual or organization are free to the public. Additional copies are sold at $2 each. All dissemination is done in hard copy printed form. Table 3 outlines the volume of GAO dissemination.

TABLE 3 Current Volume of General Accounting Office Report Dissemination. (FY 1987)

Product	Free Distribution	Sales
Briefings	184,616	
Fact Sheets	97,606	
Reports	536,582	15,508*
Staff Studies	9,684	
Testimony	77,812	
Solicitor General's Decisions	8,296	
Letters	3,930	
Memos	566	
Other	34,932	
TOTAL	953,024**	

*Virtually all sales are of Reports

**484,782 of the free items distributed did not involve a specific request, but rather were sent to individuals on established mailing lists.

Depository Library Standing Orders

GAO Annual Report	802 (microfiche)
Reports to Congress	587 (microfiche)
Bibliographies of Publications	651 (microfiche)
Documents, Catalog of Reports, Decisions, Testimony	653 (paper)
Comptroller General Decisions and Testimony	505 (microfiche)

Private publishing of GAO reports is not currently monitored or actively encouraged. GAO staff feel that "we would not have any best sellers." If requests for private publishing came directly, "we couldn't stop them, and we would certainly cooperate."

GAO Product Promotion

Public awareness of GAO products is encouraged through a semi- annual list of publications sent to the established mailing list. Until 1985, this list was part of the Comptroller's Annual Report to Congress. Since 1986, the Annual Index or Reports Issued in FY 19xx has been printed in the hope of "increasing the usefulness of the listings as a reference tool" (1986 Annual Index). One of the priorities of the Publishing Office is to broaden the scope of the existing mailing list and "enhance the publishing aspect of our operation." Press coverage of GAO activities creates a "flurry of public requests." GAO products which become part of committee reports and prints are abstracted and indexed by CIS.

The GAO Review is currently under going revision. The Review was largely an internal publication designed to communicate with the GAO staff about issues of relatively narrow concern. The Review has been out of print for one year in anticipation of a replacement publication, the GAO Journal which will begin publication in Spring 1988. The Journal is designed to handle internal communications needs and to showcase GAO efforts to the wider public. It will be distributed free both internally and "to key decision-makers in Washington via a mailing list." After discussions with the Superintendent of Documents, it was decided that their was not a market for a fee based subscription service.

GAO currently does not have an in-house searchable bibliographic data base of their own publications. The raw material for such a database exists on the tapes from which the lists of publications are printed. The planned data base would include only official reports, but this is one of the first items that will be cut with budget cut backs.

GAO is in the early stages of considering the development of a comprehensive data base of GAO reports on-line. Standardized word processing using Word Perfect has facilitated the sharing of data. The initial stage will involve storing executive summaries for on-line access. It is felt that there would be little interest in the full text of GPO reports on-line. Some preliminary discussions have been held with vendors and NTIS concerning the marketability of such a data base.

Implications of Broader Public Access to GAO Products

IMPACT ON THE CONTENT AND QUALITY OF REPORTS: Since GAO analysts already assume that their efforts will eventually be made available to the public, they would not adjust their writing style or report content if broader dissemination were anticipated.

COSTS: Given the continuation of liberal policies for distributing free copies, broader public interest would increase costs somewhat.

Criteria For Evaluating Public Access to GAO Products

TIMELINESS: Like other legislative support information, GAO research appeals to two different audiences with different needs for timeliness. Individuals and groups interested in affecting the policy process need to react to GAO efforts and are hampered by the fact that Congress gets it first and may embargo it long enough to make the eventual release useless. In the ideal world based on the premise that facts alone should determine policy, such an imbalance of information seems unreasonable. In the real world, however, where facts are interpreted and information is a power resource, it is unlikely that Congress will willingly share all its information simultaneously with all other participants. The assurance that GAO reports will be released before the final policy decision is made is the best that one can ask.

Researchers with a more historical bent who attempt to reconstruct the policy process have less need for timeliness.

COMPREHENSIVENESS: The major issue of comprehensiveness lies in the availability of indexes to GAO materials. The newly created hard copy Annual Index is a desirable step, but there is no way to search past reports, over two or more years simultaneously, or to comprehensively discover related materials such as briefing summaries or Comptroller General decisions.

SEARCHABILITY: Full text searching of GAO reports would be useful, but of relatively low priority. An on-line searchable index would be more important.

COSTS: Current GAO dissemination costs are quite lenient (first five copies free with a $2 charge for additional copies). Maintenance of free copies is highly desirable, but less liberal policies would do little to diminish access and would help compensate for increased volume likely with more promotion of products.

ARCHIVABILITY: Not a significant problem.

FLEXIBILITY: Not a significant consideration

PUBLIC ACCESS: The primary limitation on public access lies in lack of awareness, rather than structural limitations to public access. Unless the public knows something exists, lenient public access procedures mean little. GAO has been, up to this point, largely passive in promoting its products, but currently has shown increased interest in more aggressive promotion.

APPROPRIATE FORMATS FOR EXPANDED DISSEMINATION OF GAO PRODUCTS

Indexes

The development of a comprehensive on-line (or CD-ROM) index of all GAO products would not only serve the Congress well, but would likely draw considerable interest from commercial vendors. Such a data base would have even more utility if it included report summaries.

GAO Reports, Summaries, Decisons etc.

For the foreseeable future, hard copy will be the format of choice for GAO products. Since GAO materials are generally focused on single issues, a flexibly searchable index would be of more use than on-line searching of entire reports. Given limited resources, developing CD-ROM or on-line access does not seem like a worthwhile expenditure for GAO, but private vendor efforts in this area should be encouraged through provision of the electronic versions (word processing disks). In the absence of current vendor initiative, efforts should be made to preserve a comprehensive file of the electronic versions should GAO or vendor efforts be deemed appropriate in the future.

The Office of Technology Assessment (OTA)

THE ROLE OF OTA

The Office of Technology Assessment was created to give Congress an evaluation of the long term impact of technological change on public policies and issues. Observers are quick to point out the uniqueness of OTA among the congressional support agencies:

> The CRS orientation is toward the legislative process and the legislator. Whereas OTA staff orientation is toward the experts, the industrial sector and academia. Whereas CRS staff are expected to maintain their expertise via secondary resources...OTA is expected to assist in tapping primary sources of new information and knowledge by communicating directly with the nation's foremost experts (Gilbert Gude, former director of CRS quoted in U.S. Congress, House, Committee on Science and Technology, 1978, pp. 240-241).

OTA was established with a different set of operating assumptions than the other support agencies. There is no policy for confidential advising of Members or staffs, and lacking such a policy it is assumed that all OTA research will have open distribution. Analysts assume from the beginning that the results will be made public and the procedure for developing reports involves a series of public reviews. Intensive use of outside consultants, formal reviews by panels of experts, distribution of draft reports to interested parties and a final review by the Technology Assessment Board (made up of six House and six Senate Members) written "at a college sophomore level assuming an intelligent, but not highly specialized audience."

CURRENT OTA PRODUCT DEVELOPMENT

> Delivery of OTA's analysis is a process rather than a singular event....OTA must be prepared to deliver information, with appropriate caveats regarding its preliminary nature, when requested by Congress....In the end we provide the results to a much broader audience--the general public and policy makers at all levels of responsibility, nationally and internationally--through sale of reports by the Government Printing Office (Gibbons, 1984, p. 5).

After receiving a request for an analysis and approval by the Technology Assessment Board, OTA staff draw up a research plan and determine the work to be done internally and through outside contractors. Early in the process a panel of recognized experts and "stakeholders" is convened to react to the research plan. Later this panel will be given a chance to evaluate the substantive research and make additional comments on the progress of the project. Contractor papers and in-house research are distributed in draft form to a wide audience including the requesting committee, panel members, parties suggested by the researchers and individuals requesting inclusion. OTA staff take the research and comments and write a final report which is prepared in both a summary and full report format.

Although the OTA documents originate on word processors and use a number of desktop publishing techniques, final copy "paste up" is still done by hand. Thus there is no electronic version identical to the printed version. As OTA report production moves toward electronic paste up, electronic versions of OTA publications will be available.

Atleast one project (Communications Systems for an Information Age) has considered new ways in which new technology could make their reports more useable. A first step would be to use imbedded markers to create a variety of tables of contents for the same report keyed to identical substantive material. Since OTA does not index its reports, such a table of contents could serve as a surrogate index focusing on different ways to view the material. The next step might well be print-on-demand applications allowing the user to determine both the material to be selected from the report and the way in which they want it presented. For example, this report could be delivered as it is now organized around sequential coverage of each support agency, or it could combine all discussions of particular formats (print, video disk, on- line, CD-ROM, etc.).

CURRENT OTA PRODUCT DISSEMINATION

Government Dissemination

The Technology Assessment Act of 1972 (Public Law 92-484) which created the Office of Technology Assessment asserts:

> Assessments made by the Office, including information, surveys, studies, reports and findings related thereto, shall be made available to the initiating committee or other appropriate committees of Congress. In addition, any such information, surveys, studies, reports, and findings produced by the Office may be made available to the

> public except where--(1) to do so would violate security statutes; or (2) the Board considers it necessary or advisable to withhold such information...)

The Commission on the Operation of the Senate reaffirmed public access in its 1976 study when it stated:

> It is important to note that all of OTA's reprots are intended for publication....Thus , its image and reputation over time, outside the Congress, will depend in large measure on the quality of the work that is done and documented (U.S. Congress, Senate, Commission on the Operation of the Senate, 1976, p. 61).

OTA PRODUCT AWARENESS: Awareness of OTA reports comes from a variety of sources. Press coverage of OTA activity generates considerable interest among segments of the public directly involved in the area of the analyzed issue. GPO advertises selected titles in its U.S. Government Books catalog. OTA does not have input into the decision as to which publications to highlight and OTA staff members indicate that "sometimes it is pretty hard to understand why particular titles were chosen over others." OTA publishes its own list of publications which is distributed to a significant (5-6000) mailing list. The mailing list includes past participants in the OTA study process (contractors, panel members, etc.), individuals suggested by the program staff, and anyone who requests inclusion. The publications list focuses on formal reports, but also mentions working papers and contract reports. OTA reports are indexed by CIS, with some indexing of working papers and contractor reports.

The OTA Information Center (Library) maintains an in-house data base (QuOTAtion) of OTA publications. It includes over 375 reports, assessments, staff papers and technical memos dating from the beginnings of OTA. The data base does not include report summaries or contractor efforts. CRS does the original indexing of reports for the BIBL file on SCORPIO, with OTA adding additional information such as the requesting committee, project director, document type and NTIS or GPO order numbers. The data base is used to create a hard copy index as well as service staff and public requests. Although there is no inherent opposition to sharing the data base, it is felt that it would be of little interest to private vendors because of its limited content and the fact that it covers material available from other sources.

OTA PRODUCT DISSEMINATION: OTA provides multiple access points for ordering its reports. Report summaries are sent out at no cost to mailing lists suggested by the program area specialists and by request to individuals calling or writing. Full reports are sent free to a more limited mailing list. Primary public access is through the Superintendent of Documents sales office, but OTA will take mail orders with a check made out to the Superintendent of Documents. OTA reports and contractor documents (but not report summaries) are also available through NTIS (National Technical Information Service). Sales of OTA reports vary widely depending on the topic and press coverage given to it. G.P.O. may sell as few as a couple of hundred or over 25,000 copies (The Effects of Nuclear War).

OTA Reports are one of the items depository libraries can choose as free additions to their

collections. Of the 1400 depository libraries 771 have chosen to receive OTA reports and supporting materials. Reports are distributed in hard copy and contractor papers in microfiche. A recent suggestion to make microfiche distribution the only format for the reports stimulated significant negative feelings from the libraries. There is no clear pattern as to how depository or other libraries catalog OTA reports. In some cases they end up in the notoriously under catalogued government documents divisions, while other libraries include some OTA publications for inclusion in the main catalog.

The OTA Information Services Center handles 15-20 telephone calls per month. Often these involve confirming a report title or directing someone to the Publications Office, NTIS or GPO for copies of the report. The public is welcome to use the Information Services Center, and 10-15 public users come in each month, largely to use OTA reports.

As with much support agency material, congressional offices serve as the "back door" conduit to publications for citizens in the know. Constituent requests for full reports are discouraged, suggesting instead that a report summary would be adequate. If the summary is of interest, private citizens are encouraged to purchase the full report or to seek it out at a depository library. Despite discouraging distribution of reports to constituents, many congressional offices order numerous copies and "we [OTA] are under no illusion that these do not go directly to constituents." OTA is more lenient about providing full copies of reports to academic researchers and public interest groups.

Virtually all OTA information dissemination is in the form of printed documents. Some OTA projects and reports (especially in the economic realm) depend heavily on manipulable data bases created by OTA. The ability of readers to get the model disks themselves and manipulate the assumptions would clearly be beneficial, but no procedure has been created for such access. Within the limits of time, projects such as the "Technology and the American Economic Transition Project" have serviced a limited number of outside requests for running the model under different conditions. An initial approach to GPO about disseminating such disks discovered that there was no policy. "GPO was not hostile, but they also were not aggressive about establishing how it might be done." There are a number of precedents for disk distribution (Census, Commerce, etc.), but other agencies are not going through the GPO. Even if a dissemination process were developed, some minor problems would have to be solved. Although the data on these disks is in the public domain (largely government data from the Commerce Department), the disks do contain some proprietary software on which royalty will have to be paid. Additionally the user's manual would need to be published for public distribution.

Private Dissemination

OTA actively seeks out commercial publishers to reprint already published reports. Over twenty publishers are given copies of reports and offered camera ready copies. Although OTA cannot limit the publishers choosing to offer reprints, publishers intending to print the most copies are most seriously encouraged. In some cases, more than one publisher reprints the same report. For example, The Effects of Nuclear War was reprinted by Rowman and Littlefield under that name and by Chesshire books as The Day After Midnight:

The Effects of Nuclear War. OTA advertises commercially printed copies of its reports in its own publications list.

One vendor (High Tech Publishing Co., Ridge NY: 516-924-6168) has been given electronic versions of some OTA report summaries on computer disk with the intention of making them available on a bulletin board system. At this point the vendor is not quite sure how the distribution will be handled. In their words:

> We assumed that OTA Reports would come out more frequently and at regular intervals so that we could feature one report a month or so. The project is now on the back burner awaiting a better distribution plan.

IMPLICATIONS OF BROADER PUBLIC DISSEMINATION

OTA products reach such a wide and diverse public audience now that it is hard to imagine that wider dissemination of printed materials would have much impact on the substance, the product, or the work of OTA.

Access to the actual substantive data bases on which OTA did its analysis (see above discussion of economic models) is another case. Allowing others access to the models would allow them to "second guess" OTA analysis by using different assumptions. This has some exciting potential for "counter modeling" and increased public input in the policy process, but could cause some consternation among OTA staff.

SOME CRITERIA FOR EVALUATING PUBLIC ACCESS TO OTA INFORMATION PRODUCTS

Timeliness

The long nature of OTA work makes timeliness less of an issue for either participants in the policy process or those who wish to historically recreate it. OTA analyses most often serve as background papers from which specific policy analyses BEGIN, rather than integral parts of the final policy decision process. The more active segments of the policy participants might wish to be involved in the OTA process earlier. Given the open nature of the process, the major hindrance to this stems from lack of awareness that a study is in the works. Broader dissemination of "research in progress" would help solve this problem.

Comprehensiveness

Tools for determining the existence of OTA products and methods of dissemination are neither complete nor consistent. OTA Reports are relatively widely indexed and available. Indexing and Dissemination of staff papers and contractor work is less comprehensive. Only some of these documents go beyond the confines of OTA. It is not clear that there is a consistent policy (either by OTA or outside vendors) as to the criteria for deciding which of these materials should be made readily available to the public.

APPROPRIATE FORMATS FOR EXPANDED PUBLIC DISSEMINATION OF OTA PRODUCTS

OTA Reports

Hard copy printed version of OTA Reports remain the best format for general distribution. CD-ROM shows considerable promise for long term electronic storage and retrieval and OTA should cooperate with any vendor wishing to pursue such a venture. The move toward full desk top publishing creating a true electronic version of the printed copy will increase the potential for such dissemination. At a minimum, OTA should protect a full set of its electronic records should electronic retrieval be deemed appropriate in the future.

As OTA production moves toward more desk top publishing, and if more centralized GPO involvement emerges such as the dial up composition discussed in the earlier section on committee reports, OTA reports would be ideal candidates for print-on- demand processes. Even without GPO involvement, OTA might consider print on demand after an initial printing as an alternative to archiving large stockpiles of historical documents.

Report Summaries

Report Summaries to be ideal candidates for inclusion in either an in-house or external data base. OTA should continue encouraging the use of the information through a variety of vendors to determine which format (on-line/ bulletin board/ CD- ROM) has the greatest potential. It seems most likely that such information would find a home among the vendors currently disseminating congressional information. The bulletin board approach (highlighting one report a month) may increase awareness of OTA and its work, but the serious researcher will want a comprehensive and searchable data base.

Staff Papers/Contractor Reports

Staff papers and contractor reports are classic "gray area literature" which are often lost to public access. The first step in making this information more available lies in making sure that it appears in the in-house data base, with specific notations as to those papers and reports distributed through NTIS.

Data Bases

OTA could strike a significant blow in demystifying policy analysis and opening the process to more participants by sharing its substantive data bases with the public. Providing disks and software documentation would allow counter-modeling and enhance the potential that participants in the policy process would be starting from the same data, if not the same assumptions.

SOME GENERAL IMPLICATIONS OF STUDYING PUBLIC ACCESS TO SUPPORT AGENCY INFORMATION

Support agency staff showed considerable interest in the study of public access, partly out of direct concern over how new policies would affect their operations, and partly out of a more indirect hope that the study opens up the broader issue of coordinating the provision of information both inside Congress and between Congress and the public. Some representative quotes in the second realm include:

> A first step toward sharing information with the public in an efficient manner lies in the recognition that there is a great deal of redundancy within Congress. It would be a big help if new policy directed everyone within Congress to share information resources first.

> Perhaps if the public gets access to information from the support agencies we can start getting the information we need from our sister agencies. We just assumed that ---- [another support agency] would not cooperate so we did not pursue the electronic information we needed.

With everyone knocking on our doors to get access to our information, perhaps we [the support agencies] will unite against the common "enemy" and begin to see our joint self interest rather than constantly feeling threatened by each other.

SOME LESSONS FOR THE FUTURE OF THE GOVERNMENT PRINTING OFFICE

Changes in the information dissemination process of the congressional support agencies have little direct impact on the printing activities of GPO, because to the degree that printing is done of support agency materials, it is largely contracted out. Opinion among the support agency staff charged with printing nonofficial publications through the contracting process quite consistently expressed the opinion that they would like to bypass GPO printing services, but are quite satisfied with the new aggressiveness of the marketing efforts of the Superintendent of Documents. Comments such as the following were common:

> We would much rather contract out our work independently and retain the control over vendors which we now do not have.

> At the production stage, there is nothing GPO can do that we can't do. They have to contact the same contractors we would contact. Using them simply adds time and headaches.

> GPO printing standards are a double edged sword. Standards have obviously raised the level of quality, but the fact that GPO work always looks like GPO work marks a publication as a government document. This carries with it some negative reaction.

> We do some of our printing with non-appropriated funds and are therefore not under

the requirement to go through GPO. GPO cannot meet our needs in-house and there is no good reason to go through them for the contracting process. Our non-G.P.O. facilitated printing is easier to have done.

We have begun to consistently reject a lot of what GPO contractors do for us. We just won't accept pictures or logos printed upside down. It takes a lot of paper work, but we have to do something to keep these contractors in line. It is frustrating, though, to find the same contractors we have consistently rejected work from allowed to win another round of contracts. It is even more frustrating to realize that documents go out to the depository libraries before we have had a chance to check the quality, thus flooding the depositories with inferior products over our organization's name.

While dealing with GPO for printing has its drawbacks, we are encouraged by the ability of the Superintendent of Documents to distribute our materials.

A consolidated point of sale at GPO. is a real benefit. People know about GPO. and they should take the lead in selling our publications no matter where we have them produced.

While support agency staff have little interest in duplicating the Superintendent of Documents Sales Program, they want to retain the right to promote their own materials through their own channels. Some also point out that the SupDocs is severely hampered under current law:

The Superintendent of Documents is clearly constrained by Title 44 in any attempt to more broadly distribute government materials through commercial booksellers. Bookstores expect a discount of over 40%, the ability to pay on credit, and the right to return unsold books. Title 44 limits the Superintendent of Documents to a 25% discount and government procedures require advance payment and discourage the return of unsold copies.

With expanded availability of records in electronic form, the Superintendent of Documents has a considerable challenge to create a mechanism for effectively disseminating such material and providing the user support necessary.

CONCLUSION

From the citizens perspective, on the outside looking in, the fine distinctions staff of the support agencies make concerning their unique roles and responsibilities seem rather insignificant. The more sophisticated among the public realize that the information provided by support agencies affects the outcome of public policy and realize that they will be at a disadvantage to support or counteract particular policies unless they have some awareness of the information on which Members of Congress are making decisions. In the broader context, the support agencies can play a significant role in expanding society's base of knowledge and spreading its more widely. If a broader range of support agency information is defined as being in the public domain, new technologies can contribute a great deal to

making the public aware of the information resources and facilitating the dissemination process.

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